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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|-----------------|-------------|----------------------|---------------------|------------------|
| 10/791,996 | 03/03/2004 | Carmen Flosbach | FA1013 US DIV | 4286 |

23906 7590 08/03/2004

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EXAMINER

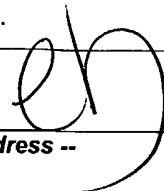
TSOY, ELENA

ART UNIT PAPER NUMBER

1762

DATE MAILED: 08/03/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

| | | | |
|------------------------------|--------------------------------------|--|---|
| Office Action Summary | Application No. 10/791,996 | Applicant(s) FLOSBACH ET AL. | |
| | Examiner Elena Tsoy | Art Unit 1762 |  |

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 03 March 2004.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 11-21 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 11-21 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date <u>3/3/04</u> . | 6) <input type="checkbox"/> Other: _____ |

Response to Preliminary Amendment

Preliminary Amendment filed on March 3, 2004 has been entered. Claims 1-10 have been cancelled. New claims 11-21 have been added. Claims 11-21 are pending in the application.

Claim Objections

1. Claim 19 is objected to because of the following informalities: "dimmer" in lines 2 and 4 should be changed to "dimer".

Specification

2. The specification is objected to as failing to provide proper antecedent basis for the claimed subject matter. See 37 CFR 1.75(d)(1) and MPEP § 608.01(o). Correction of the following is required: cycloaliphatic polyols having 3-6 hydroxyl groups of Claim 17 are not in the body of the disclosure. Polyols recited on page 3, lines 8-13 of the specification as filed such as glycerol, trimethylolpropane, pentaerithrytol, etc. are not cycloaliphatic polyols. Amendment of the disclosure to incorporate the language of originally filed claims does not raise issue of new matter.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claim Rejections - 35 USC § 103

4. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

5. **Claims 11-16, 18-21** are rejected under 35 U.S.C. 102(b) as being anticipated by Duecoffre et al (US 6,063,448).

Duecoffre et al disclose a process comprising applying a multi-layer coating including transparent outer coat (See column 10, lines 58-60; column 11, lines 40-49) or pigmented coat (See column 11, lines 3-9) on a substrate such as automobile parts (See column 1, lines 7-12; column 11, lines 40-49) using a coating agent comprising B) 90 to 10% by weight of one or more hydroxy-functional polyesters (claimed component a); A) 10 to 90% by weight of one or more hydroxy-functional (meth)acrylic copolymers and C) 0 to 40% by weight of one or more hydroxy-functional binder vehicles different from A) and B) (A and C being claimed component b); D) 5 to 50% by weight of one or more blocked polyisocyanates (See column 7, lines 37-67) and E) 5 to 40% by weight of one or more components based on triazine which crosslink with the hydroxyl groups of components A), B) (D and E being claimed component c); wherein the sum of components A) to E) adds up to 100% (See column 14, lines 1-33). The polyester resins B) preferably have number average molecular weights of 200 to 5000, most preferably 1000 to 3000, an OH number of 30 to 450 mg KOH/g, most preferably from 120 to 280 mg KOH/g, and an acid number of 0 to 60 mg KOH/g, most preferably from 2 to 35 mg KOH/g (See column 5, lines 55-60). The polyester resins B) may be prepared using 10 to 70% by weight of a mixture of

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polycarboxylic acids including fumaric acids (See column 6, line 25) and dimeric fatty acids (See column 6, line 26), 0 to 60% by weight of monocarboxylic acids, and 5 to 40% by weight of tri- and/or polyhydric alcohols such as glycerol, trimethylolpropane, pentaerythritol, dipentaerythritol (See column 6, lines 32-37), 0 to 40% by weight of diols, 0 to 15% by weight of hydroxycarboxylic acids (See column 14, lines 40-65). The coating composition may exist as organic solvent based composition (See examples 1-5) or in a water-thinnable form (See column 10, lines 10-11).

6. **Claim 11** is rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Duecoffre et al (US 6,063,448).

Duecoffre et al are applied here for the same reasons as above. Even if it could be argued that the coating agent of Duecoffre et al can be used to form a multi-layer coating, it would have been obvious to one of ordinary skill in the art at the time the invention was made to have reapplied a coating composition of Miyabayashi et al with the expectation of providing the desired thickness of a final coating depending on intended use of the final coated product, in the absence of a showing of criticality, since it is a well-known principle to reapply a coating composition to achieve a desired thickness of a final coating.

7. **Claims 12, 13, 16, 18-21** are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Miyabayashi et al (US 4,880,890).

Miyabayashi et al disclose a process for forming a coating layer on a substrate (See column 7, line 14) such as steel, aluminum (See column 6, lines 55-57) comprising applying a coating composition either directly to a substrate or to a substrate pre-coated with a primer (See column 6, lines 60-62) such as polyester primer (See column 7, lines 3-4), and curing the coated

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layer, thereby forming two (multi) layer coating. The coating composition is either (transparent) and clear (See column 6, lines 25-26) or pigmented (See column 6, line 35). The coating composition comprises aliphatic (non-aromatic) polyester polyol and blocked polyisocyanate (See column 2, lines 14-29) in claimed amounts (See Example 8 and Tables 1, 3). The aliphatic polyester polyol can be prepared by reacting aliphatic dicarboxylic acid that including dimer acid (See column 4, line 57), (cyclo)aliphatic polyol having at least three functional groups (See column 4, lines 48-69; column 5, lines 1-20). The examples include polyester polyol prepared with a hydroxyl component comprising a polyol having at least three functional groups in amounts as high as about 75%. The polyester polyol can be prepared from TMP (trimethylol propane) and aliphatic dicarboxylic acid and has an acid value of 3.8, hydroxy value of 446.1, number average molecular weight of 623 and a hydroxyl functionality of 5. The coating composition may be based on organic solvents (See column 6, lines 28-29). Miyabayashi et al further teach that the metal substrates can be *optionally* fabricated into parts *after* applying a the polyester polyol coating (See column 1, lines 11-15) due to flexibility of the coating and its strong adhesion to the substrates ion them into parts (See column 1, lines 11-12).

Even if it could be argued that coating a primer coated substrate forms a multi-layer coating, it would have been obvious to one of ordinary skill in the art at the time the invention was made to have reapplied a coating composition of Miyabayashi et al according to a well-known principle, with the expectation of providing the desired thickness of a final coating depending on intended use of the final coated product, in the absence of a showing of criticality

8. **Claim 11** is rejected under 35 U.S.C. 103(a) as being unpatentable over Miyabayashi et al (US 4,880,890).

Miyabayashi et al are applied here for the same reasons as above. Miyabayashi et al further teach that the volume of the resin composition to be applied is not limitative (See column 7, lines 7-11). However, Miyabayashi et al fail to teach that the coating resin composition can be used to form a multi-layer coating (Claim 11).

It is a well-known principle to reapply a coating composition to achieve a desired thickness of a final coating, depending on intended use of the final coated product.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to have reapplied a coating composition of Miyabayashi et al according to a well-known principle, with the expectation of providing the desired thickness of a final coating depending on intended use of the final coated product, in the absence of a showing of criticality.

9. **Claims 14, 15** are rejected under 35 U.S.C. 103(a) as being unpatentable over Miyabayashi et al (US 4,880,890) in view of Willey (US 5,023,141).

Miyabayashi et al fail to teach that the polyester primer is colored base coat (Claim 14); and the substrate is automotive body and body parts (Claim 15).

Willey teaches that high solids colored polyester primer (base coat) can be primarily used in the manufacture of automobiles (See column 1, lines 7-8) for coating steel, aluminum or plastic substrates (See column 1, lines 48-58) to cover imperfections in surfaces (See column 1, lines 59-62) and provides the surface to which conventional topcoats will adhere (See column 1, lines 57-58).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to have used high solids colored polyester primer of Willey as a primer (base coat) in Miyabayashi et al for covering automobile bodies or body parts with the expectation of providing

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the desired coverage of imperfections in surfaces, since Willey teaches that high solids colored polyester primer (base coat) can be primarily used in the manufacture of automobiles for coating steel, aluminum or plastic substrates to cover imperfections in surfaces and provides the surface to which conventional topcoats will adhere.

10. **Claim 17** is rejected under 35 U.S.C. 103(a) as being unpatentable over Duecoffre et al (US 6,063,448) in view of JP 08239458 (Abstract).

Duecoffre et al, as applied above, fail to teach that cycloaliphatic polyol having 3-6 hydroxyl groups can be used as polyol.

JP 08239458 teaches that alicyclic (cycloaliphatic) polyol having at least 3 hydroxyl groups can be used for reacting with itaconic, maleic, or fumaric acids to make polyester polyol having a hydroxyl value of 60-400 (See Abstract).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to have used alicyclic (cycloaliphatic) polyol having at least 3 hydroxyl groups for reacting with fumaric acid in Duecoffre et al with the expectation of producing the desired polyester polyol having claimed hydroxyl value of 40-460 since JP 08239458 teaches that alicyclic (cycloaliphatic) polyol having at least 3 hydroxyl groups can be used for reacting with itaconic, maleic, or fumaric acids to make polyester polyol having a hydroxyl value of 60-400.

It is held that the selection of a known material based on its suitability for its intended use supported a prima facie obviousness determination in *Sinclair & Carroll Co. v. Interchemical Corp.*, 325 U.S. 327, 65 USPQ 297 (1945). See also *In re Leshin*, 227 F.2d 197, 125 USPQ 416 (CCPA 1960) (selection of a known plastic to make a container of a type made of plastics prior

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to the invention was held to be obvious); *Ryco, Inc. v. Ag-Bag Corp.*, 857 F.2d 1418, 8 USPQ2d 1323 (Fed. Cir. 1988).

11. **Claim 17** is rejected under 35 U.S.C. 103(a) as being unpatentable over Miyabayashi et al (US 4,880,890) in view of JP 08239458 (Abstract).

Miyabayashi et al, as applied above, fail to teach that cycloaliphatic polyol having 3-6 hydroxyl groups can be used as polyol.

JP 08239458 teaches that alicyclic (cycloaliphatic) polyol having at least 3 hydroxyl groups can be used for reacting with itaconic, maleic, or fumaric acids to make polyester polyol having a hydroxyl value of 60-400 (See Abstract).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to have used alicyclic (cycloaliphatic) polyol having at least 3 hydroxyl groups for reacting with itaconic, maleic, or fumaric acids in Miyabayashi et al with the expectation of producing the desired polyester polyol having claimed hydroxyl value of 40-460 since JP 08239458 teaches that alicyclic (cycloaliphatic) polyol having at least 3 hydroxyl groups can be used for reacting with itaconic, maleic, or fumaric acids to make polyester polyol having a hydroxyl value of 60-400.

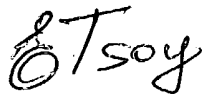
Conclusion

12. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Elena Tsoy whose telephone number is (571) 272-1429. The examiner can normally be reached on Mo-Thur. 9:00-7:30.

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If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Shrive Beck can be reached on (571) 272-1415. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

A handwritten signature in black ink, appearing to read 'ETsoy'.

Elena Tsoy
Primary Examiner
Art Unit 1762

July 28, 2004